kerakoll

Certified B Corporation

Kind Customer

We send you the documentation concerning the products supplied: **S45 , S45F**

- Information letter concerning Regulation (EU) 2019/1148 on the marketing and use of explosives precursors
- Material Safety Data Sheet

For further information and clarifications, please contact us at safety@kerakoll.com

Best regards,

kerakoll
Kerakoll Spa - via dell'Artigianato 9
41049 Sassuolo (MO) Italia
C.F./P.I. 01174510360

kerakoll

Certified B Corporation

Esteemed Customer

Sassuolo, 19/04/2024

Object: provisions of Regulation (EU) 2019/1148 concerning the marketing (including online) and use of Explosives Precursors starting from February 1, 2021

Kind Customer,

we hereby inform you that starting from 1st of February 2021, provisions of EU 2019/1148 Regulation inherent to Explosive Precursors will be applied. This new legislation aims to reinforce the system of controlling the availability on the market of Explosive Precursor, in order to limit the availability of certain substances for private consumers and to guarantee the adequate reporting of suspicious transactions. Substances included in the field of application are listed in the respective annex of the regulation:

- Annex I – Explosive Precursors subject to RESTRICTION
- Annex II - Explosive Precursors subject to SEGNALATION

The legislations is applied to pure substances and to mixtures containing those components (depending from the concentration) and the fulfilments of the requirements for each subjects involved in the supply chain are dependent from the type of precursors.

Within the product supplied from us, there are not precursors subject to restriction.

REGULATED PRECURSORS

To date, the products S45 , S45F that we supply, contains the following substance included in the precursors list: Acetone N° CAS 67-64-1

A regulated explosive precursor:

- is available for a professional user o for a private consumer if it is possible to demonstrate to the national authority in charge of inspections, that the staff involved in sales is:

a) Aware of which of the marketed products contains regulated explosive precursors;

b) Educated about the obligation set by the legislation.

- is available to an economic operator only after informing it that that the acquisition, introduction, detention or the use by private consumers is subject to reporting (see next point).

Reporting of suspicious transaction, shipments, disappearances and thefts

Economic operators and online markets must report suspicious transactions, after considering all circumstances, especially in case that the customer acts as follow:

a) He is not able to give accurate description of the predicted use of explosive precursors

b) He seems to be unrelated to the predicted use of the regulated explosive precursor or he cannot explain it in a reasonable way.

c) He has the intention of buying regulated explosive precursors in an unusual quantity, combination or concentration for a legit use.

d) He is reluctant to give a document to validate his identity, place of residence or the status of professional user or of economic operator

e) He insists on using an unusual payment method, like large amount of cash for instance.

Economic operators and on-line markets may reject the suspicious transaction and they can report it within 24 hours to the national point of contact of the member state where the transaction was made or attempted.

Economic operators and professional users report to the national contact point of the member state, disappearances and significant thefts of regulated explosive precursors within 24 hours from the detection.

CONTACT POINTS:

- AUSTRIA: Bundeskriminalamt - Meldestelle Drogenausgangsstoffe; E-mail: Precursor@bmi.gv.at;Tel. +43 1 24836 985372
- BELGIUM: Federale politie - Police fédérale - Föderale Polizei; explosiveprecursor@police.belgium.eu ; Tel.: 00 32 26 42 63 20 (24h/24h); Tel Duty Officer: 00 32 475 29 28 88 (24h/24h)
- BULGARIA: Министерство на вътрешните работи; тел. (+359) 2 9828 336 тел. (+359) 2 9828 106; gdbop@mvr.bg
- CROATIA: Ministarstvo unutarnjih poslova, Ravnateljstvo policije; Email: prekursori@mup.hr ; Tel: +38513788776
- CYPRUS: Αρχηγείο Αστυνομίας; Telephone1: + 357 22 808262 (during office hours) Telephone2: +357 99 629353 (available 24/7); deptc.cto@police.gov.cy
- CZECH REPUBLIC: Český báňský úřad; email: Info@cbusbs.cz ; tel. +420 721 329 137; Policie - National Organized Crime Agency tel.: +420 974 842 333 E-mail: ncoz.t4@pcr.cz; ncoz.nkbt.info@pcr.cz;
- DENMARK: National Situation and Operations Centre; email: pol-nsioc@politi.dk; tel: +4545153400
- ESTONIA: Politsei- ja Piirivalveamet; Phone: +372 612 3810 and 112; E-mail: spoc@politsei.ee
- FINLAND: Keskusrikospoliisi; Tel. +358 504 177 229; E-mail: lahtoaine.krp@poliisi.fi
- FRANCE: Pôle judiciaire de la Gendarmerie nationale; Plateau d'investigation Armes à feu et explosifs (PIXAF); Adresse mail : pixaf@gendarmerie.interieur.gouv.fr; Téléphone : +33 1 78 47 34 29
- GERMANY: Landeskriminalamt; Emergency line: 110

  - Baden-Württemberg, 0711/5401-3333, stuttgart.lka@polizei.bwl.de
  - Bayern, 089/1212-0, blka@polizei.bayern.de
  - Berlin, 030/4664-950130, lka5fuedsteuerung@polizei.berlin.de
  - Brandenburg, 03334/388-0, monitoring.fdlka@polizei.brandenburg.de
  - Bremen, 0421/362-3888, landeskriminalamt@polizei.bremen.de

- Hamburg, 040/4286-72610, lkahh26.kkvd@polizei.hamburg.de
- Hessen, 0611/83-1186, ful.hlka@polizei.hessen.de
- Mecklenburg-Vorpommern, 03866/64-9003, lka@polmv.de
- Niedersachsen, 0511/26262-0, liz@lka.polizei.niedersachsen.de
- Nordrhein-Westfalen, 0211/939-0, poststelle.lka@polizei.nrw.de
- Rheinland-Pfalz, 06131/65-2350, lka.21.ldd@polizei.rlp.de
- Saarland, 0681/962-2133, lpp212@polizei.slpol.de
- Sachsen, 0351/855-0, lka@polizei.sachsen.de
- Sachsen-Anhalt, 0391/250-0, lka@polizei.sachsen-anhalt.de
- Schleswig-Holstein, 0431/160-0, lob.glfz@polizei.landsh.de
- Thüringen, 0361/341-1224, auswertung.lka@polizei.thueringen.de

- GREECE: Ελληνική Αστυνομία; Tel: +302106914916; email: dka_opla@police.gr
- HUNGARY: National Police Headquarters; Tel.: 061/443-5500; Tel. 107; Tel. 112; Email: orfktitkarsag@orfk.police.hu;
- IRELAND: An Garda Síochána; Phone: +353 1 6661782 (office hours); or Garda 24hr Confidential Line: 1800 666 111; or 999 or 112 (in the event of a serious or imminent threat); Email: Liaisonandprotection_DV@garda.ie
- ITALY: Ministero dell'Interno; Tel.: +390646542182; precursori@dcpc.interno.it
- LATVIA: Valsts drošības dienests; Tel. (+371) 67208964; E-mail: kontaktpunkts@vdd.gov.lv
- LITHUANIA: Policijos Departamentas, Prie vidaus reikalų ministerijos; Phone +370 5 271 9949; email: leidimai.pd@policija.lt
- LUXEMBOURG: Police grand-ducale; Direction générale – Service des relations internationals; Point de contact central – INTERPOL – EUROPOL – SIRENE; Courriel : sri@police.etat.lu; Tel : (+352) 4997-2575; Fax : (+352) 4997-2598
- MALTA: Competition and Consumer Affairs Authority; Tel. (+356) 23952000; Fax : (+356) 21242420; E-mail: info@mccaa.org.mt
- NETHERLANDS: Meldpunt Verdachte Transacties Chemicaliën; Belastingdienst / Nationale politie; Tel. 0031 88 154 00 00 (24/7); E-mail: precursoren@belastingdienst.nl (08-17 hrs)
- NORWAY: Den nasjonale enhet for bekjempelse av organisert og annen alvorlig kriminalitet (Kripos); Tel. + 47 23 20 80 10; E-mail: kripos.kjemiskestoffer@politiet.no
- POLAND: Komenda Główna Policji; Puławska 148/150, 02-624; Warszawa tel. +48 226 012 012 tel; +48 22 60 116 40; e-mail: prekursory@policja.gov.pl
- Ministério da Administração Interna - Polícia de Segurança Pública; tlf: +351 218111000; Fax: + 351 21 3874772; E-mail: depaex@psp.pt
- ROMANIA: Poliția Română; Tel . +4021/312.78.20; e-mail: anne@politiaromana.ro
- SLOVAKIA: Ministerstvo vnútra; Tel . 00421 - 2/9610 56201; E-mail: prekurzoryvybusnin@minv.sk

- SLOVENIA: Ministrstvo za notranje zadeve – POLICIJA; interpol.ljubljana@policija.si; T. +386 1 428 4780; T. +386 41 713 680; T. +386 41 713 699; Fax. +386 1 428 4790
- SPAIN: Ministerio del Interior - Centro de Inteligencia contra el Terrorismo y el Crimen Organizado (CITCO) Tel. +34 91 537 27 66 Tel. +34 91 537 27 26 Tel. +34 91 537 27 33; E-mail:cico@interior.es; E-mail: precursores@interior.es SWEDEN: Polismyndigheten; Tel. 114 14 (+46 77 114 14 00 from abroad); E-mail: prekursor@polisen.se
- SWITZERLAND: Federal Office of Police – fedpol; National Contact Point for Explosives Precursors; Phone: +41 58 460 52 10; Email: chemicals@fedpol.admin.ch
- UNITED KINDOM – GRAT BRITAIN: Metropolitan Police Service; Tel. 0207 230 9066; Tel. 0207 2308850; E-mail: Chemical.Reporting@Met.Police.UK
- UNITED KINDOM – NORTHERN IRELAND: Police Service of Northern Ireland; Tel. 0800 789 321; Email: Chemical.reporting@psni.pnn.police.uk

The information about the presence of regulated explosive precursors has to be extended along the supply chain, by sending the Material Safety Data Sheet of the product.

Sanctions

Anyone who, without being entitled, introduces into the State territory, holds, uses or makes available to private individuals the substances or mixtures that contain them indicated as precursors of explosives subject to restriction in Annex I and anyone who fails to report the to the Authority the theft or the disappearance of the substances indicated as precursors of regulated explosives included in Annexes I and II, is punished with the sanctions provided by the reference State.

Kind Regards,

Kerakoll Spa - via dell'Artigianato 9
41049 Sassuolo (MO) Italia
C.F./P.I. 01174510360

Safety Data Sheet

Skladno z Uredbo ES št. 1907/2006 (REACH), Člen 31, Priloga II, kot spremenjeno z Uredbo Komisije (EU) št. 2020/878

S45 F

Date of first edition: 19. 07. 2021

Safety Data Sheet dated 20/10/2026 version 8

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Mixture identification:

Trade name: S45 F

Trade code: 28022020

1.2. Relevant identified uses of the substance or mixture and uses advised against

Recommended use: Lepila, tesnilne mase

Uses advised against: Uporabe, ki niso priporočene

1.3. Details of the supplier of the safety data sheet

Company: KERAKOLL S.p.A.

Via dell'Artigianato, 9

41049 Sassuolo (MODENA) - ITALY

Tel.+39 0536 816511 Fax. +39 0536816581

safety@kerakoll.com

1.4. Emergency telephone number

112 v primeru zastrupitve v sil/ in case of emergency poisoning

SECTION 2: Hazards identification



2.1. Classification of the substance or mixture

Regulation (EC) n. 1272/2008 (CLP)

Flam. Liq. 2	Highly flammable liquid and vapour.
Eye Irrit. 2	Causes serious eye irritation.
STOT SE 3	May cause drowsiness or dizziness.
Aquatic Chronic 2	Toxic to aquatic life with long lasting effects.

Adverse physicochemical, human health and environmental effects:

No other hazards

2.2. Label elements

Regulation (EC) No 1272/2008 (CLP):

Hazard pictograms and Signal Word



Danger

Hazard statements

H225	Highly flammable liquid and vapour.
H319	Causes serious eye irritation.
H336	May cause drowsiness or dizziness.
H411	Toxic to aquatic life with long lasting effects.

Precautionary statements

P210	EU4$P210
P260	Do not breathe vapours.
P273	Avoid release to the environment.
P280	Wear protective gloves/clothing and eye/face protection.
P370+P378	In case of fire, use a dry powder fire extinguisher to extinguish.

Special Provisions:

EUH208 Contains kalofonija. May produce an allergic reaction.

EUH066 Repeated exposure may cause skin dryness or cracking.

Contains

etil acetat

Aceton

Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane

Special provisions according to Annex XVII of REACH and subsequent amendments:

Nobena

2.3. Other hazards

No PBT, vPvB or endocrine disruptor substances present in concentration >= 0.1%

Other Hazards: No other hazards

SECTION 3: Composition/information on ingredients

3.1. Substances

N.A.

3.2. Mixtures

Mixture identification: S45 F

Hazardous components within the meaning of the CLP regulation and related classification:

Qty	Name	Ident. Numb.	Classification	Registration Number	Material Properties
≥20-<50 %	Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane	EC:926-605-8	Flam. Liq. 2, H225; STOT SE 3, H336; Asp. Tox. 1, H304; Aquatic Chronic 2, H411, M-Chronic:1, EUH066	01-2119486291-36	
≥20-<50 %	Aceton	CAS:67-64-1 EC:200-662-2 Index:606-001-00-8	Flam. Liq. 2, H225; Eye Irrit. 2, H319; STOT SE 3, H336, EUH066	01-2119471330-49	
≥5-<10 %	etil acetat	CAS:141-78-6 EC:205-500-4 Index:607-022-00-5	Flam. Liq. 2, H225; Eye Irrit. 2, H319; STOT SE 3, H336, EUH066	01-2119475103-46	
≥0.5-<1 %	kalofonija	CAS:8050-09-7 EC:232-475-7 Index:650-015-00-7	Skin Sens. 1, H317	01-2119480418-32	
≥0.25-<0.3 %	cinkov oksid	CAS:1314-13-2 EC:215-222-5 Index:030-013-00-7	Aquatic Acute 1, H400; Aquatic Chronic 1, H410, M-Chronic:1, M-Acute:1	01-2119463881-32	
≥0.1-<0.15 %	n-heksan	CAS:110-54-3 EC:203-777-6 Index:601-037-00-0	Flam. Liq. 2, H225; Repr. 2, H361f; Asp. Tox. 1, H304; STOT SE 3, H336; STOT RE 1, H372; Skin Irrit. 2, H315; Aquatic Chronic 2, H411		SVHC

SECTION 4: First aid measures

4.1. Description of first aid measures

In case of skin contact:

Immediately take off all contaminated clothing.

Areas of the body that have - or are only even suspected of having - come into contact with the product must be rinsed immediately with plenty of running water and possibly with soap.

Wash thoroughly the body (shower or bath).

Remove contaminated clothing immediatley and dispose off safely.

After contact with skin, wash immediately with soap and plenty of water.

In case of eyes contact:

After contact with the eyes, rinse with water with the eyelids open for a sufficient length of time, then consult an opthalmologist immediately.

Protect uninjured eye.

In case of Ingestion:

Do not induce vomiting, get medical attention showing the SDS and label hazardous.

In case of Inhalation:

Remove casualty to fresh air and keep warm and at rest.

4.2. Most important symptoms and effects, both acute and delayed

Eye irritation

Eye damages

4.3. Indication of any immediate medical attention and special treatment needed

In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media:

In case of fire, use a dry powder fire extinguisher to extinguish.

Extinguishing media which must not be used for safety reasons:

None in particular.

5.2. Special hazards arising from the substance or mixture

Do not inhale explosion and combustion gases.

Burning produces heavy smoke.

5.3. Advice for firefighters

Use suitable breathing apparatus .

Collect contaminated fire extinguishing water separately. This must not be discharged into drains.

Move undamaged containers from immediate hazard area if it can be done safely.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

For non emergency personnel:

Wear personal protection equipment.

Remove all sources of ignition.

Remove persons to safety.

See protective measures under point 7 and 8.

For emergency responders:

Wear personal protection equipment.

6.2. Environmental precautions

Do not allow to enter into soil/subsoil. Do not allow to enter into surface water or drains.

Retain contaminated washing water and dispose it.

In case of gas escape or of entry into waterways, soil or drains, inform the responsible authorities.

Suitable material for taking up: absorbing material, organic, sand

6.3. Methods and material for containment and cleaning up

Suitable material for taking up: absorbing material, organic, sand

Wash with plenty of water.

6.4. Reference to other sections

See also section 8 and 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Avoid contact with skin and eyes, inhalation of vapours and mists.

Don't use empty container before they have been cleaned.

Before making transfer operations, assure that there aren't any incompatible material residuals in the containers.

Contamined clothing should be changed before entering eating areas.

Do not eat or drink while working.

See also section 8 for recommended protective equipment.

Advice on general occupational hygiene:

7.2. Conditions for safe storage, including any incompatibilities

Keep away from unguarded flame, sparks, and heat sources. Avoid direct exposure to sunlight.

Incompatible materials:

Instructions as regards storage premises:

Cool and adequately ventilated.

7.3. Specific end use(s)

Recommendation(s)

None in particular

Industrial sector specific solutions:

None in particular

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Community Occupational Exposure Limits (OEL)

Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane

	ACGIH	Long Term: 400 mg/m3 (8h)

Aceton

CAS: 67-64-1	ACGIH	Long Term: 250 ppm (8h); Short Term: 500 ppm Notes: A4, BEI - URT and eye irr, CNS impair
	EU	Long Term: 1210 mg/m3 - 500 ppm (8h)
	NATIONAL Avstrija	Long Term: 1200 mg/m3 - 500 ppm; Short Term: 4800 mg/m3 - 2000 ppm Notes: 15(Miw), 4x, MAK Source: GKV, BGBl. II Nr. 156/2021
	NATIONAL Belgija	Long Term: 594 mg/m3 - 246 ppm; Short Term: 1187 mg/m3 - 492 ppm Source: Code du bien-être au travail, Livre VI, Titre 1er, Annexe VI.1-1
	NATIONAL Bolgarija	Long Term: 600 mg/m3; Short Term: 1400 mg/m3 Source: НАРЕДБА № 13 ОТ 30 ДЕКЕМВРИ 2003 Г.
	NATIONAL Ciper	Long Term: 1210 mg/m3 - 500 ppm Notes: δέρμα Source: Οι περί Ασφάλειας και Υγείας στην Εργασία (Χημικοί Παράγοντες) Κανονισμοί του 2001 έως 2021
	NATIONAL Češka	Long Term: 800 mg/m3; Short Term: Ceiling - 1500 mg/m3 Source: Nařízení vlády č. 361-2007 Sb
	NATIONAL Nemčija	Long Term: 1200 mg/m3 - 500 ppm Notes: AGS, DFG, EU, Y, 2(I) Source: TRGS 900
	NATIONAL Danska	Long Term: 600 mg/m3 - 250 ppm Notes: E Source: BEK nr 2203 af 29/11/2021
	NATIONAL Španija	Long Term: 1210 mg/m3 - 500 ppm Notes: VLB®, VLI Source: LEP 2022
	NATIONAL Estonija	Long Term: 1210 mg/m3 - 500 ppm Source: Vabariigi Valitsuse, 20. märtsi 2001. a määrus nr 105
	NATIONAL Finska	Long Term: 1200 mg/m3 - 500 ppm; Short Term: 1500 mg/m3 - 630 ppm Source: HTP-ARVOT 2020
	NATIONAL Francija	Long Term: 1210 mg/m3 - 500 ppm; Short Term: 2420 mg/m3 - 1000 ppm Source: INRS outil65, article R. 4412-149 du Code du travail
	NATIONAL Grčija	Long Term: 1780 mg/m3; Short Term: 3560 mg/m3 Source: ΦΕΚ 94/Α` 13.5.1999
	NATIONAL Hrvaška	Long Term: 1210 mg/m3 - 500 ppm Source: 2000/39/EZ
	NATIONAL Madžarska	Long Term: 1210 mg/m3 Notes: i, EU[1], N Source: 5/2020. (II. 6.) ITM rendelet
	NATIONAL Irska	Long Term: 1210 mg/m3 - 500 ppm Notes: IOELV Source: 2021 Code of Practice
	NATIONAL Italija	Long Term: 1210 mg/m3 - 500 ppm Source: D.lgs. 81/2008, Allegato XXXVIII
	NATIONAL Litva	Long Term: 1210 mg/m3 - 500 ppm; Short Term: 2420 mg/m3 - 1000 ppm Source: 2011 m. rugsėjo 1 d. Nr. V-824/A1-389
	NATIONAL Luksemburg	Long Term: 1210 mg/m3 - 500 ppm Source: Mémorial A n.226 du 22 mars 2021
	NATIONAL Latvija	Long Term: 1210 mg/m3 - 500 ppm Source: KN325P1

	NATIONAL	Malta	Long Term: 1210 mg/m3 - 500 ppm Source: S.L.424.24
	NATIONAL	Nizozemska	Long Term: 1210 mg/m3; Short Term: 2420 mg/m3 Source: Arbeidsomstandighedenregeling - Lijst A
	NATIONAL	Norveška	Long Term: 295 mg/m3 - 125 ppm Notes: E Source: FOR-2021-06-28-2248
	NATIONAL	Poljska	Long Term: 600 mg/m3; Short Term: 1800 mg/m3 Source: Dz.U. 2018 poz. 1286
	NATIONAL	Portugalska	Long Term: 1210 mg/m3 - 500 ppm Source: Decreto-Lei n.º 1/2021
	NATIONAL	Romunija	Long Term: 1210 mg/m3 - 500 ppm Notes: Dir. 2000/39 Source: Republicarea 1 - nr. 743 din 29 iulie 2021
	NATIONAL	Slovaška	Long Term: 1210 mg/m3 - 500 ppm Notes: 7) Source: 355 NARIADENIE VLÁDY z 10. mája 2006
	NATIONAL	Slovenija	Long Term: 1210 mg/m3 - 500 ppm; Short Term: 2420 mg/m3 - 1000 ppm Notes: Y, BAT, EU1 Source: UL št. 72, 11. 5. 2021
	NATIONAL	Švedska	Long Term: 600 mg/m3 - 250 ppm; Short Term: 1200 mg/m3 - 500 ppm Notes: V Source: AFS 2021:3
	WEL-EH40	UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND	Long Term: 1210 mg/m3 - 500 ppm; Short Term: 3620 mg/m3 - 1500 ppm Source: EH40/2005 Workplace exposure limits (Fourth Edition 2020)
	SUVA	Švicar	Long Term: 1200 mg/m3 - 500 ppm; Short Term: 2400 mg/m3 - 1000 ppm Notes: B, VR SNC Yeux / AW ZNS Auge, NIOSH Source: suva.ch/valeurs-limites

etil acetat

CAS: 141-78-6	EU		Long Term: 734 mg/m3 - 200 ppm (8h); Short Term: 1468 mg/m3 - 400 ppm
	NATIONAL	Avstrija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Notes: 15(Miw), 4x, MAK Source: BGBl. II Nr. 156/2021
	NATIONAL	Belgija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: Code du bien-être au travail, Livre VI, Titre 1er, Annexe VI.1-1
	NATIONAL	Bolgarija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: НАРЕДБА № 13 ОТ 30 ДЕКЕМВРИ 2003 Г.
	NATIONAL	Ciper	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: Οι περί Ασφάλειας και Υγείας στην Εργασία (Χημικοί Παράγοντες) Κανονισμοί του 2001 έως 2021
	NATIONAL	Češka	Long Term: 700 mg/m3; Short Term: Ceiling - 900 mg/m3 Notes: I Source: Nařízení vlády č. 361-2007 Sb
	NATIONAL	Nemčija	Long Term: 730 mg/m3 - 200 ppm Notes: DFG, EU, Y, 2(I) Source: TRGS 900
	NATIONAL	Danska	Long Term: 540 mg/m3 - 150 ppm Notes: E Source: BEK nr 2203 af 29/11/2021
	NATIONAL	Španija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Notes: VLI Source: LEP 2022
	NATIONAL	Estonija	Long Term: 500 mg/m3 - 150 ppm; Short Term: 1100 mg/m3 - 300 ppm Source: Vabariigi Valitsuse, 20. märtsi 2001. a määrus nr 105

NATIONAL	Finska	Long Term: 730 mg/m3 - 200 ppm; Short Term: 1470 mg/m3 - 400 ppm Source: HTP-ARVOT 2020
NATIONAL	Francija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: INRS outil65, article R. 4412-149 du Code du travail
NATIONAL	Grčija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: Π.Δ. 82/2018 (ΦΕΚ 152/Α` 21.8.2018)
NATIONAL	Hrvaška	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: 2017/164/EU
NATIONAL	Madžarska	Long Term: 734 mg/m3; Short Term: 1468 mg/m3 Notes: i, sz, EU4, N Source: 5/2020. (II. 6.) ITM rendelet
NATIONAL	Irska	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Notes: IOELV Source: 2021 Code of Practice
NATIONAL	Italija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: D.lgs. 81/2008, Allegato XXXVIII
NATIONAL	Litva	Long Term: 500 mg/m3 - 150 ppm; Short Term: Ceiling - 1100 mg/m3 - 300 ppm Source: 2011 m. rugsėjo 1 d. Nr. V-824/A1-389
NATIONAL	Luksemburg	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: Mémorial A n.226 du 22 mars 2021
NATIONAL	Latvija	Long Term: 200 mg/m3 - 54 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: KN325P1
NATIONAL	Malta	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: S.L.424.24
NATIONAL	Nizozemska	Long Term: 734 mg/m3; Short Term: 1468 mg/m3 Source: Arbeidsomstandighedenregeling - Lijst A
NATIONAL	Norveška	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Notes: E S Source: FOR-2021-06-28-2248
NATIONAL	Poljska	Long Term: 734 mg/m3; Short Term: 1468 mg/m3 Source: Dz.U. 2018 poz. 1286
NATIONAL	Portugalska	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: Decreto-Lei n.º 1/2021
NATIONAL	Romunija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Notes: Dir. 2017/164 Source: Republicarea 1 - nr. 743 din 29 iulie 2021
NATIONAL	Slovaška	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: 355 NARIADENIE VLÁDY z 10. mája 2006
NATIONAL	Slovenija	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Notes: Y, EU4 Source: UL št. 72, 11. 5. 2021
NATIONAL	Švedska	Long Term: 550 mg/m3 - 150 ppm; Short Term: 1100 mg/m3 - 300 ppm Source: AFS 2021:3
WEL-EH40	UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND	Long Term: 734 mg/m3 - 200 ppm; Short Term: 1468 mg/m3 - 400 ppm Source: EH40/2005 Workplace exposure limits (Fourth Edition 2020)
SUVA	Švicar	Long Term: 730 mg/m3 - 200 ppm; Short Term: 1460 mg/m3 - 400 ppm Notes: SSC, VRS Yeux / OAW Auge, INRS NIOSH Source: suva.ch/valeurs-limites

kalofonija

CAS: 8050-09-7	ACGIH	Long Term: 0.001 mg/m3 (8h) Notes: I, DSEN, RSEN - Asthma, resp and eye irr, dermal and resp sens
NATIONAL	Češka	Long Term: 1 mg/m3 Notes: S, V Source: Nařízení vlády č. 361-2007 Sb

	NATIONAL	Španija	Notes: m, Sen Source: LEP 2022
	NATIONAL	UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND	Long Term: 0.05 mg/m3 (8h); Short Term: 0.15 mg/m3
	NATIONAL	Hrvaška	Long Term: 0.05 mg/m3; Short Term: 0.15 mg/m3 Notes: alergen koža Source: NN 1/2021
	NATIONAL	Latvija	Long Term: 4 mg/m3 Source: KN325P1
	NATIONAL	Romunija	Long Term: 0.1 mg/m3 Source: Republicarea 1 - nr. 743 din 29 iulie 2021
	WEL-EH40	UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND	Long Term: 0.05 mg/m3; Short Term: 0.15 mg/m3 Notes: Sen Source: EH40/2005 Workplace exposure limits (Fourth Edition 2020)
	SUVA	Švicar	Notes: S, Poumons Peau / Lunge Haut Source: suva.ch/valeurs-limites
cinkov oksid			
CAS: 1314-13-2	ACGIH		Long Term: 2 mg/m3 (8h); Short Term: 10 mg/m3 Notes: R - Metal fume fever
	NATIONAL	Avstrija	Long Term: 5 mg/m3 Notes: MAK, A Source: BGBl. II Nr. 156/2021
	NATIONAL	Belgija	Long Term: 2 mg/m3; Short Term: 10 mg/m3 Source: Code du bien-être au travail, Livre VI, Titre 1er, Annexe VI.1-1
	NATIONAL	Bolgarija	Long Term: 5 mg/m3; Short Term: 10 mg/m3 Source: НАРЕДБА № 13 ОТ 30 ДЕКЕМВРИ 2003 Г.
	NATIONAL	Češka	Long Term: 2 mg/m3; Short Term: Ceiling - 5 mg/m3 Source: Nařízení vlády č. 361-2007 Sb
	NATIONAL	Danska	Long Term: 4 mg/m3 Source: BEK nr 2203 af 29/11/2021
	NATIONAL	Španija	Long Term: 2 mg/m3; Short Term: 10 mg/m3 Notes: d Source: LEP 2022
	NATIONAL	Estonija	Long Term: 5 mg/m3 Source: Vabariigi Valitsuse, 20. märtsi 2001. a määrus nr 105
	NATIONAL	Finska	Long Term: 2 mg/m3; Short Term: 10 mg/m3 Source: HTP-ARVOT 2020
	NATIONAL	Francija	Long Term: 5 mg/m3 Source: INRS outil65
			Long Term: 10 mg/m3 Source: INRS outil65
	NATIONAL	Grčija	Long Term: 5 mg/m3; Short Term: 10 mg/m3 Source: ΦΕΚ 94/Α` 13.5.1999
	NATIONAL	Hrvaška	Long Term: 2 mg/m3; Short Term: 10 mg/m3 Notes: GVI: R Source: NN 1/2021
	NATIONAL	Madžarska	Long Term: 5 mg/m3 Notes: i, N Source: 5/2020. (II. 6.) ITM rendelet
			Long Term: 5 mg/m3 Notes: i, R

		Source: 5/2020. (II. 6.) ITM rendelet
	NATIONAL Irska	Long Term: 2 mg/m3; Short Term: 10 mg/m3 Notes: OEL (8-hour reference period) : R Source: 2021 Code of Practice
	NATIONAL Litva	Long Term: 5 mg/m3 Source: 2011 m. rugsėjo 1 d. Nr. V-824/A1-389
	NATIONAL Latvija	Long Term: 0.5 mg/m3 Source: KN325P1
	NATIONAL Norveška	Long Term: 5 mg/m3 Source: FOR-2021-06-28-2248
	NATIONAL Poljska	Long Term: 5 mg/m3; Short Term: 10 mg/m3 Notes: 4) Source: Dz.U. 2018 poz. 1286
	NATIONAL Romunija	Long Term: 5 mg/m3; Short Term: 10 mg/m3 Notes: (Fumuri) Source: Republicarea 1 - nr. 743 din 29 iulie 2021
	NATIONAL Slovaška	Long Term: 1 mg/m3; Short Term: 1 mg/m3 Notes: 11) Source: 355 NARIADENIE VLÁDY z 10. mája 2006
	NATIONAL Švedska	Long Term: 5 mg/m3 Notes: 3 Source: AFS 2021:3
	SUVA Švicar	Long Term: 3 mg/m3; Short Term: 3 mg/m3 Notes: TWA mg/m3: (a), Fimétal / Metallrauch, NIOSH OSHA Source: suva.ch/valeurs-limites
n-heksan		
CAS: 110-54-3	ACGIH	Long Term: 50 ppm (8h) Notes: Skin, BEI - CNS impair, peripheral neuropathy, eye irr
	EU	Long Term: 72 mg/m3 - 20 ppm (8h)
	NATIONAL Avstrija	Long Term: 72 mg/m3 - 20 ppm; Short Term: 288 mg/m3 - 80 ppm Notes: 15(Miw), 4x, MAK, f Source: BGBl. II Nr. 156/2021
	NATIONAL Belgija	Long Term: 72 mg/m3 - 20 ppm Source: Code du bien-être au travail, Livre VI, Titre 1er, Annexe VI.1-1
	NATIONAL Bolgarija	Long Term: 72 mg/m3 - 20 ppm Source: НАРЕДБА № 13 ОТ 30 ДЕКЕМВРИ 2003 Г.
	NATIONAL Švicar	Long Term: 180 mg/m3 - 50 ppm (8h); Short Term: 1440 mg/m3 - 400 ppm
	NATIONAL Ciper	Long Term: 72 mg/m3 - 20 ppm Source: Οι περί Ασφάλειας και Υγείας στην Εργασία (Χημικοί Παράγοντες) Κανονισμοί του 2001 έως 2021
	NATIONAL Češka	Long Term: 70 mg/m3; Short Term: Ceiling - 200 mg/m3 Notes: I, D Source: Nařízení vlády č. 361-2007 Sb
	NATIONAL Nemčija	Long Term: 180 mg/m3 - 50 ppm Notes: DFG, EU, Y, 8(II) Source: TRGS 900
	NATIONAL Danska	Long Term: 72 mg/m3 - 20 ppm Notes: E Source: BEK nr 2203 af 29/11/2021
	NATIONAL Španija	Long Term: 72 mg/m3 - 20 ppm Notes: VLB®, VLI Source: LEP 2022
	NATIONAL Estonija	Long Term: 72 mg/m3 - 20 ppm Source: Vabariigi Valitsuse, 20. märtsi 2001. a määrus nr 105
	NATIONAL Finska	Long Term: 72 mg/m3 - 20 ppm Notes: iho Source: HTP-ARVOT 2020

NATIONAL	Francija	Long Term: 72 mg/m3 - 20 ppm Notes: Toxique pour la reproduction de catégorie 2 Source: INRS outil65, article R. 4412-149 du Code du travail
NATIONAL	UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND	Long Term: 72 mg/m3 - 20 ppm (8h)
NATIONAL	Grčija	Long Term: 72 mg/m3 - 20 ppm Source: ΦΕΚ 202/Α` 23.8.2007
NATIONAL	Hrvaška	Long Term: 72 mg/m3 - 20 ppm Notes: koža Source: 2006/15/EZ
NATIONAL	Madžarska	Long Term: 72 mg/m3 Notes: b, i, BEM, EU2, T Source: 5/2020. (II. 6.) ITM rendelet
NATIONAL	Irska	Long Term: 72 mg/m3 - 20 ppm Notes: IOELV, Sk Source: 2021 Code of Practice
NATIONAL	Italija	Long Term: 72 mg/m3 - 20 ppm Source: D.lgs. 81/2008, Allegato XXXVIII
NATIONAL	Litva	Long Term: 72 mg/m3 - 20 ppm Notes: R Source: 2011 m. rugsėjo 1 d. Nr. V-824/A1-389
NATIONAL	Luksemburg	Long Term: 72 mg/m3 - 20 ppm Source: Mémorial A n.226 du 22 mars 2021
NATIONAL	Latvija	Long Term: 72 mg/m3 - 20 ppm Notes: Ietekme uz dzirdi Source: KN325P1
NATIONAL	Malta	Long Term: 72 mg/m3 - 20 ppm Source: S.L.424.24
NATIONAL	Nizozemska	Long Term: 72 mg/m3; Short Term: 144 mg/m3 Source: Arbeidsomstandighedenregeling - Lijst A
NATIONAL	Norveška	Long Term: 72 mg/m3 - 20 ppm Notes: R E Source: FOR-2021-06-28-2248
NATIONAL	Poljska	Long Term: 72 mg/m3 Notes: skóra Source: Dz.U. 2018 poz. 1286
NATIONAL	Portugalska	Long Term: 72 mg/m3 - 20 ppm Source: Decreto-Lei n.º 1/2021
NATIONAL	Romunija	Long Term: 72 mg/m3 - 20 ppm Notes: R2, Dir. 2006/15 Source: Republicarea 1 - nr. 743 din 29 iulie 2021
NATIONAL	Slovaška	Long Term: 72 mg/m3 - 20 ppm; Short Term: 140 mg/m3 - 40 ppm Notes: 7) Source: 355 NARIADENIE VLÁDY z 10. mája 2006
NATIONAL	Slovenija	Long Term: 72 mg/m3 - 20 ppm; Short Term: 576 mg/m3 - 160 ppm Notes: Y, BAT, EU2, RD2 Source: UL št. 72, 11. 5. 2021
NATIONAL	Švedska	Long Term: 72 mg/m3 - 20 ppm; Short Term: 180 mg/m3 - 50 ppm Source: AFS 2021:3
WEL-EH40	UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND	Long Term: 72 mg/m3 - 20 ppm Source: EH40/2005 Workplace exposure limits (Fourth Edition 2020)
SUVA	Švicar	Long Term: 180 mg/m3 - 50 ppm; Short Term: 1440 mg/m3 - 400 ppm

Notes: R/H, R2F, SSC, B, Yeux SN / Auge NS, NIOSH
Source: suva.ch/valeurs-limites

Biological limit values

Aceton

CAS: 67-64-1 Biological Indicator: Acetone; Sampling Period: End of turn
Value: 80 mg/L; Medium: Urine
Remark: Not Specific

n-heksan

CAS: 110-54-3 Biological Indicator: 2.5-hexanedione in the urine; Sampling Period: End of turn
Value: 5 mg/L; Medium: Urine

Predicted No Effect Concentration (PNEC) values

Aceton

CAS: 67-64-1 Exposure Route: Fresh Water; PNEC Limit: 10.6 mg/l
Exposure Route: Intermittent releases (fresh water); PNEC Limit: 21 mg/l
Exposure Route: Marine water; PNEC Limit: 1.06 mg/l
Exposure Route: Mikroorganizmi v čiščenju odplak; PNEC Limit: 100 mg/l
Exposure Route: Freshwater sediments; PNEC Limit: 30.4 mg/kg
Exposure Route: Usedline morske vode; PNEC Limit: 3.04 mg/kg
Exposure Route: Zemlja; PNEC Limit: 29.5 mg/kg

etil acetat

CAS: 141-78-6 Exposure Route: Fresh Water; PNEC Limit: 240 mg/m3
Exposure Route: Intermittent releases (fresh water); PNEC Limit: 1.65 mg/l
Exposure Route: Marine water; PNEC Limit: 24 mg/m3
Exposure Route: Mikroorganizmi v čiščenju odplak; PNEC Limit: 650 mg/l
Exposure Route: Freshwater sediments; PNEC Limit: 1.15 mg/kg
Exposure Route: Usedline morske vode; PNEC Limit: 115 µg/kg
Exposure Route: Zemlja; PNEC Limit: 148 µg/kg
Exposure Route: Secondary poisoning; PNEC Limit: 200 mg/kg

kalofonija

CAS: 8050-09-7 Exposure Route: Fresh Water; PNEC Limit: 1.6 mg/m3
Exposure Route: Intermittent releases (fresh water); PNEC Limit: 16 mg/m3
Exposure Route: Marine water; PNEC Limit: 160 ng/L
Exposure Route: Mikroorganizmi v čiščenju odplak; PNEC Limit: 1000 mg/l
Exposure Route: Freshwater sediments; PNEC Limit: 7 µg/kg
Exposure Route: Usedline morske vode; PNEC Limit: 0.7 µg/kg
Exposure Route: Zemlja; PNEC Limit: 0.45 µg/kg

Derived No Effect Level (DNEL) values

Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane

Exposure Route: Human Inhalation; Exposure Frequency: Long Term, systemic effects
Worker Professional: 5306 mg/kg/day; Consumer: 1131 mg/kg/day

Exposure Route: Human Dermal; Exposure Frequency: Long Term, systemic effects
Worker Professional: 13964 mg/kg; Consumer: 1377 mg/kg

Exposure Route: Human Oral; Exposure Frequency: Long Term, systemic effects
Consumer: 1301 mg/kg

etil acetat

CAS: 141-78-6 Exposure Route: Human Inhalation; Exposure Frequency: Long Term, systemic effects
Worker Professional: 734 mg/kg/day; Consumer: 367 mg/kg/day

Exposure Route: Human Inhalation; Exposure Frequency: Short Term, systemic effects
Worker Professional: 1468 mg/kg/day; Consumer: 734 mg/kg/day

Exposure Route: Human Inhalation; Exposure Frequency: Long Term, local effects
Worker Professional: 734 mg/kg/day; Consumer: 367 mg/kg/day

Exposure Route: Human Inhalation; Exposure Frequency: Short Term, local effects

Worker Professional: 1468 mg/kg/day; Consumer: 734 mg/kg/day

Exposure Route: Human Dermal; Exposure Frequency: Long Term, systemic effects
Worker Professional: 63 mg/kg; Consumer: 37 mg/kg

Exposure Route: Human Oral; Exposure Frequency: Long Term, systemic effects
Consumer: 4.5 mg/kg

kalofonija

CAS: 8050-09-7 Exposure Route: Human Dermal; Exposure Frequency: Long Term, systemic effects
Worker Professional: 2.131 mg/kg; Consumer: 1.065 mg/kg

Exposure Route: Human Oral; Exposure Frequency: Long Term, systemic effects
Consumer: 1.065 mg/kg

n-heksan

CAS: 110-54-3 Exposure Route: Human Inhalation; Exposure Frequency: Long Term, systemic effects
Worker Professional: 75 mg/kg/day; Consumer: 16 mg/kg/day

Exposure Route: Human Dermal; Exposure Frequency: Long Term, systemic effects
Worker Professional: 11 mg/kg; Consumer: 5.3 mg/kg

Exposure Route: Human Oral; Exposure Frequency: Long Term, systemic effects
Consumer: 4 mg/kg

8.2. Exposure controls

Eye protection:

Očala s stransko zaščito.(EN166)

Protection for skin:

Kemična zaščitna oblačila. Zaščitna obutev

Protection for hands:

Contact the glove manufacturer for specific advice on glove selection and breakthrough times for your use conditions.

Respiratory protection:

Plinski filter tipa AX.

Thermal Hazards:

Wear appropriate thermal protective clothing, when necessary.

Environmental exposure controls:

Ne dovolite, da izdelek pride v kanalizacijo ali v površinske ali podzemne vode.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state:	Liquid
Colour:	light yellow
Odour:	characteristic
pH:	Not Relevant
Kinematic viscosity:	> 20,5 mm2/s (40 °C)
Melting point/freezing point:	10 °C (50 °F)
Boiling point or initial boiling point and boiling range:	36 °C (97 °F)
Flash point:	< 23°C
Lower and upper explosion limit:	9.40 % (UEL). 1.50 % (LEL).
Relative vapour density:	N.A.
Vapour pressure:	107.20 (kPa 50°C). mm Hg @ 20°C
Density and/or relative density:	0.90 g/cm3
Solubility in water:	Netopno
Solubility in oil:	N.A.
Partition coefficient n-octanol/water (log value):	N.A.

Auto-ignition temperature:	N.A.
Decomposition temperature:	N.A.
Flammability:	The product is classified Flam. Liq. 2
Volatile Organic compounds - VOCs =	74.40%; 669.60g/L

Particle characteristics:

Particle size: N.A.

9.2. Other information

Viscosity: 4,500.00 cPo

No other relevant information

SECTION 10: Stability and reactivity

10.1. Reactivity

Stable under normal conditions

10.2. Chemical stability

Data not available.

10.3. Possibility of hazardous reactions

None.

10.4. Conditions to avoid

Stable under normal conditions.

10.5. Incompatible materials

Avoid contact with oxidizing materials. The product could catch fire.

10.6. Hazardous decomposition products

None.

SECTION 11: Toxicological information

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

Toxicological Information of the Preparation

a) acute toxicity	Not classified
	Based on available data, the classification criteria are not met
b) skin corrosion/irritation	Not classified
	Based on available data, the classification criteria are not met
c) serious eye damage/irritation	The product is classified: Eye Irrit. 2(H319)
d) respiratory or skin sensitisation	Not classified
	Based on available data, the classification criteria are not met
e) germ cell mutagenicity	Not classified
	Based on available data, the classification criteria are not met
f) carcinogenicity	Not classified
	Based on available data, the classification criteria are not met
g) reproductive toxicity	Not classified
	Based on available data, the classification criteria are not met
h) STOT-single exposure	The product is classified: STOT SE 3(H336)
i) STOT-repeated exposure	Not classified
	Based on available data, the classification criteria are not met
j) aspiration hazard	Not classified
	Based on available data, the classification criteria are not met

Toxicological information on main components of the mixture:

Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane

	a) acute toxicity	LD50 Oral Rat = 25 ml/kg
		LC50 Inhalation Rat = 73860 mg/kg
		LD50 Skin Rat = 5 ml/kg

Aceton

CAS: 67-64-1	a) acute toxicity	LD50 Oral Rat = 5800 mg/kg
		LC50 Inhalation Vapour Rat = 76 mg/l 4h

		LD50 Skin Rabbit > 7400 mg/kg 24h
	b) skin corrosion/irritation	Skin Irritant Rabbit Negative
	c) serious eye damage/irritation	Eye Irritant Rabbit Yes
	d) respiratory or skin sensitisation	Skin Sensitization Guineapig Negative
	f) carcinogenicity	Genotoxicity Negative
	g) reproductive toxicity	No Observed Effect Level Oral Rat = 10000 mg/l
etil acetat		
CAS: 141-78-6	a) acute toxicity	LD50 Oral Rat = 5620 mg/kg
		LC50 Inhalation Vapour Rat > 22.5 mg/l 6h
		LD50 Skin Rabbit > 20000 mg/kg 24h
	b) skin corrosion/irritation	Skin Irritant Rabbit Negative 24h
	c) serious eye damage/irritation	Eye Irritant Rabbit No
	d) respiratory or skin sensitisation	Skin Sensitization Guineapig Negative
	f) carcinogenicity	Genotoxicity Negative
	g) reproductive toxicity	No Observed Adverse Effect Level Oral = 13800 mg/kg
kalofonija		
CAS: 8050-09-7	a) acute toxicity	LD50 Oral Rat > 2000 mg/kg
		LD50 Skin Rat > 2000 mg/kg 24h
	b) skin corrosion/irritation	Skin Irritant Rabbit Negative
	c) serious eye damage/irritation	Eye Irritant No 6h
	d) respiratory or skin sensitisation	Skin Sensitization Negative
	g) reproductive toxicity	No Observed Adverse Effect Level Oral Rat = 5000
cinkov oksid		
CAS: 1314-13-2	a) acute toxicity	LD50 Oral Rat > 5000 mg/kg
		LC50 Inhalation Rat > 5.7 mg/l 4h
		LD50 Skin Rat > 2000 mg/kg 24h
	b) skin corrosion/irritation	Skin Irritant Rabbit Negative
	c) serious eye damage/irritation	Eye Irritant Rabbit No
	d) respiratory or skin sensitisation	Skin Sensitization Guineapig Negative
	f) carcinogenicity	Genotoxicity Negative
	g) reproductive toxicity	No Observed Adverse Effect Level Oral Rat = 7.2 mg/kg
n-heksan		
CAS: 110-54-3	a) acute toxicity	LD50 Oral Rat = 24 ml/kg
		LC50 Inhalation Vapour Rat = 73860 ppm 4h
		LD50 Skin Rabbit > 5 ml/kg 4h
	b) skin corrosion/irritation	Skin Irritant Rabbit Positive
	c) serious eye damage/irritation	Eye Irritant Rabbit No
	d) respiratory or skin sensitisation	Skin Sensitization Negative
	f) carcinogenicity	Genotoxicity Negative
		Carcinogenicity Negative
	g) reproductive toxicity	No Observed Adverse Effect Level Inhalation Rat = 10560 mg/m3

11.2. Information on other hazards

Endocrine disrupting properties:

No endocrine disruptor substances present in concentration >= 0.1%

SECTION 12: Ecological information

12.1. Toxicity

Adopt good working practices, so that the product is not released into the environment.

Eco-Toxicological Information:

Toxic to aquatic life with long lasting effects.

List of Eco-Toxicological properties of the product

The product is classified: Aquatic Chronic 2(H411)

List of Eco-Toxicological properties of the components

Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane

a) Aquatic acute toxicity: LC50 Fish onocorhynchus mykiss = 12 mg/L 96h

a) Aquatic acute toxicity: EC50 Daphnia daphinia magna = 3 mg/L 48h

a) Aquatic acute toxicity: EC50 Algae pseudokirchneriella subcapitata = 55 mg/L 72h

Aceton

CAS: 67-64-1

a) Aquatic acute toxicity: LC50 Fish Oncorhynchus mykiss = 5540 mg/L 96h

a) Aquatic acute toxicity: LC50 Daphnia Daphnia pulex = 8800 mg/L 48h

b) Aquatic chronic toxicity: NOEC Daphnia Daphnia magna = 2212 mg/L

a) Aquatic acute toxicity: NOEC Algae Microcystis aeruginosa = 530 mg/L

a) Aquatic acute toxicity: NOEC Sludge Activated sludge = 1000 mg/L

d) Terrestrial toxicity: LC50 Worm Eisenia fetida = 0.55 mg/cm2 48h

etil acetat

CAS: 141-78-6

a) Aquatic acute toxicity: LC50 Fish S Gairdneri = 230 mg/L 96h

b) Aquatic chronic toxicity: NOEC Fish freshwater fish = 6.9 mg/L

a) Aquatic acute toxicity: LC50 Daphnia Daphnia Cucullata = 165 mg/L 48h

b) Aquatic chronic toxicity: NOEC Daphnia daphnia magna = 2.4 mg/L

a) Aquatic acute toxicity: EC50 Algae S. subspicatus = 5600 mg/L 48h

c) Bacteria toxicity: NOEC Pseudomonas putida = 650 mg/L

kalofonija

CAS: 8050-09-7

a) Aquatic acute toxicity: EL50 Fish Leuciscus idus > 1000 mg/L 96h

a) Aquatic acute toxicity: EL50 Daphnia > 100 mg/L 48h

a) Aquatic acute toxicity: EC50 microorganisms > 10000 mg/L

a) Aquatic acute toxicity: EL50 Algae > 100 mg/L 48h

cinkov oksid

CAS: 1314-13-2

a) Aquatic acute toxicity: LC50 Fish Oncorrhynchus Mykiss = 0.169 mg/L 96h

b) Aquatic chronic toxicity: NOEC Fish Cyprinodontidae , Cyprinidae, Salmonidae and Cottidae = 0.044 mg/L

a) Aquatic acute toxicity: EC50 Ceriodaphnia dubia = 0.147 mg/L

b) Aquatic chronic toxicity: NOEC aquatic invertebrates = 0.014 mg/L

a) Aquatic acute toxicity: IC50 Algae Selenastrum capricornutum = 0.136 mg/L

b) Aquatic chronic toxicity: NOEC Algae = 0.06 mg/L

c) Bacteria toxicity: NOEC Sludge activated slugde = 100 µg/L

d) Terrestrial toxicity: EC10 Worm Lumbricus terrestris = 1634 mg/kg

d) Terrestrial toxicity: EC10 Folsomia candida = 14.6 mg/kg

n-heksan

CAS: 110-54-3

a) Aquatic acute toxicity: LL50 Fish freshwater fish = 12.51 mg/L 96h

b) Aquatic chronic toxicity: NOEC Fish = 2.8 mg/L

a) Aquatic acute toxicity: EL50 freshwater invertebrates = 21.85 mg/L 48h

b) Aquatic chronic toxicity: NOELR freshwater invertebrate = 4.88 mg/L

a) Aquatic acute toxicity: EL50 Algae = 9.28 mg/L 48h

12.2. Persistence and degradability

Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane

	Readily biodegradable	
Aceton		
CAS: 67-64-1	Readily biodegradable	Test: Biochemical oxigen demand; Value: 90
etil acetat		
CAS: 141-78-6	Readily biodegradable	Test: CO2 production; Value: 94 Notes: 28days
n-heksan		
CAS: 110-54-3	Readily biodegradable	

12.3. Bioaccumulative potential

Aceton		
CAS: 67-64-1	Bioaccumulative	Test: BCF - Bioconcentrantion factor; Value: 3
etil acetat		
CAS: 141-78-6	Bioaccumulative	Test: BCF - Bioconcentrantion factor; Value: 30 Notes: aquatic species
kalofonija		
CAS: 8050-09-7	Bioaccumulative	Test: BCF - Bioconcentrantion factor; Value: 56.23 Notes: L/kg ww.
n-heksan		
CAS: 110-54-3	Bioaccumulative	Test: BCF - Bioconcentrantion factor; Value: 501

12.4. Mobility in soil

N.A.

12.5. Results of PBT and vPvB assessment

Ni sestavine PBT/vPvB.

12.6. Endocrine disrupting properties

No endocrine disruptor substances present in concentration >= 0.1%

12.7. Other adverse effects

N.A.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Če je mogoče, predelajte. Pošljite v usposobljena odlagališča ali v zažig pod kontroliranimi pogoji. Ravnajte se po lokalnih in državnih normah. Odstranjevanje z izpustom v odpadne vode ni dovoljeno

Odstranjeni izdelek mora biti v skladu z Uredbo (EU) 1357/2014 razvrščen kot nevaren odpadek

Šifre odpadkov v skladu z Evropski seznam odpadkov (ESO) ni mogoče določiti zaradi odvisnosti od uporabe. Obrnite se na pooblaščeno službo za odstranjevanje odpadkov.

Properties of waste which render it hazardous (Annex III, Directive 2008/98/EC):

N.A.

SECTION 14: Transport information

14.1. UN number or ID number

1133

14.2. UN proper shipping name

ADR-Shipping Name: ADHESIVES containing flammable liquid (vapour pressure at 50 °C more than 110 kPa)

IATA-Shipping Name: ADHESIVES containing flammable liquid

IMDG-Shipping Name: ADHESIVES containing flammable liquid

14.3. Transport hazard class(es)

ADR-Class: 3

IATA-Class: 3

IMDG-Class: 3

14.4. Packing group

ADR-Packing Group: II

IATA-Packing group: II

IMDG-Packing group: II

14.5. Environmental hazards

Most important toxic component: Hydrocarbons, C6-C7, isoalkanes, cyclics, <5% n-hexane

Marine pollutant: Yes
Environmental Pollutant: Yes
IMDG-EMS: F-E, S-D

14.6. Special precautions for user

Road and Rail (ADR-RID):

ADR-Label: 3
ADR - Hazard identification number: 33
ADR-Special Provisions: 640C
ADR-Transport category (Tunnel restriction code): 2 (D/E)
ADR Limited Quantities: 5 L
ADR Excepted Quantities: E2

Air (IATA):

IATA-Passenger Aircraft: 353
IATA-Cargo Aircraft: 364
IATA-Label: 3
IATA-Subsidiary hazards: -
IATA-Erg: 3L
IATA-Special Provisions: A3

Sea (IMDG):

IMDG-Stowage and handling: Category B
IMDG-Segregation: -
IMDG-Subsidiary hazards: -
IMDG-Special Provisions: -

14.7. Maritime transport in bulk according to IMO instruments

N.A.

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

Dir. 98/24/EC (Risks related to chemical agents at work)
Dir. 2000/39/EC (Occupational exposure limit values)
Regulation (EC) n. 1907/2006 (REACH)
Regulation (EU) n. 2020/878

Regulation (EC) n. 1272/2008 (CLP)	Regulation (EC) n. 790/2009 (ATP 1 CLP) and (EU) n. 758/2013
Regulation (EU) n. 286/2011 (ATP 2 CLP)	Regulation (EU) n. 618/2012 (ATP 3 CLP)
Regulation (EU) n. 487/2013 (ATP 4 CLP)	Regulation (EU) n. 944/2013 (ATP 5 CLP)
Regulation (EU) n. 605/2014 (ATP 6 CLP)	Regulation (EU) n. 2015/1221 (ATP 7 CLP)
Regulation (EU) n. 2016/918 (ATP 8 CLP)	Regulation (EU) n. 2016/1179 (ATP 9 CLP)
Regulation (EU) n. 2017/776 (ATP 10 CLP)	Regulation (EU) n. 2018/669 (ATP 11 CLP)
Regulation (EU) n. 2018/1480 (ATP 13 CLP)	Regulation (EU) n. 2019/521 (ATP 12 CLP)
Regulation (EU) n. 2020/217 (ATP 14 CLP)	Regulation (EU) n. 2020/1182 (ATP 15 CLP)
Regulation (EU) n. 2021/643 (ATP 16 CLP)	Regulation (EU) n. 2021/849 (ATP 17 CLP)
Regulation (EU) n. 2022/692 (ATP 18 CLP)	Regulation (EU) n. 2023/707
Regulation (EU) n. 2023/1434 (ATP 19 CLP)	Regulation (EU) n. 2023/1435 (ATP 20 CLP)
Regulation (EU) n. 2024/197 (ATP 21 CLP)	Regulation (EU) n. 2024/2564 (ATP 22 CLP)
Regulation (EU) n. 2024/2865	Regulation (EU) n. 2025/1222 (ATP 23 CLP)

Regulation (EC) nr 648/2004 (Detergents).

Omejitve, povezane z izdelkom ali vsebovanimi snovmi, v skladu s Prilogo XVII Uredbe (ES) 1907/2006 (REACH) in poznejše spremembe:

Restrictions related to the product: 3, 40
Restrictions related to the substances contained: 75

Provisions related to directive EU 2012/18 (Seveso III):

Seveso III category according to Annex 1, part 1	Lower-tier threshold (tonnes)	Upper-tier threshold (tonnes)
Product belongs to category: P5c	5000	50000
Product belongs to category: E2	200	500

Explosives precursors – Regulation 2019/1148

No substances listed

Regulation (EU) No 649/2012 (PIC regulation)

No substances listed

German Water Hazard Class.

Razred 3: izjemno nevarna.

German Lagerklasse according to TRGS 510:

LGK 3

SVHC Substances:

Substances in candidate list (Art. 59 Reg. 1907/2006, REACH):

Component	Ident. Numb.	Quantity	Material Properties
n-heksan	CAS: 110-54-3	≥0.1-<0.15 %	SVHC
	EINECS: 203-777-6		Specific target organ toxicity - repeated exposure
	Index: 601-037-00-0		

Regulation (EU) 2019/1148 on the marketing and use of explosives precursors

ACETONE (CAS 67-64-1): ANNEX II - Regulated explosive precursors.

Substance indicated in section 3.2 included in Annex II (regulated precursor).

This product is regulated by Regulation (EU) 2019/1148: all suspicious transactions and significant disappearances and thefts must be reported to the competent national contact point: Ministrstvo za notranje zadeve - POLICIJA - interpol.ljubljana@policija.si; T. +386 1 428 4780; T. +386 41 713 680; T. +386 41 713 699; Fax. +386 1 428 4790

15.2. Chemical safety assessment

No Chemical Safety Assessment has been carried out for the mixture.

Substances for which a Chemical Safety Assessment has been carried out:

Aceton

etil acetat

cinkov oksid

SECTION 16: Other information

Code	Description
EUH066	Repeated exposure may cause skin dryness or cracking.
H225	Highly flammable liquid and vapour.
H304	May be fatal if swallowed and enters airways.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H336	May cause drowsiness or dizziness.
H361f	Suspected of damaging fertility.
H372	Causes damage to organs (T) through prolonged or repeated exposure.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.

Code	Hazard class and hazard category	Description
2.6/2	Flam. Liq. 2	Flammable liquid, Category 2
3.10/1	Asp. Tox. 1	Aspiration hazard, Category 1
3.2/2	Skin Irrit. 2	Skin irritation, Category 2
3.3/2	Eye Irrit. 2	Eye irritation, Category 2
3.4.2/1	Skin Sens. 1	Skin Sensitisation, Category 1
3.7/2	Repr. 2	Reproductive toxicity, Category 2
3.8/3	STOT SE 3	Specific target organ toxicity — single exposure, Category 3
3.9/1	STOT RE 1	Specific target organ toxicity — repeated exposure, Category 1
4.1/A1	Aquatic Acute 1	Acute aquatic hazard, category 1
4.1/C1	Aquatic Chronic 1	Chronic (long term) aquatic hazard, category 1
4.1/C2	Aquatic Chronic 2	Chronic (long term) aquatic hazard, category 2

Classification and procedure used to derive the classification for mixtures according to Regulation (EC) 1272/2008 [CLP]:

Classification according to Regulation (EC) Nr. 1272/2008	Classification procedure

Flam. Liq. 2, H225	On basis of test data
Eye Irrit. 2, H319	Calculation method
STOT SE 3, H336	Calculation method
Aquatic Chronic 2, H411	Calculation method

This document was prepared by a competent person who has received appropriate training.

Main bibliographic sources:

ECDIN - Environmental Chemicals Data and Information Network - Joint Research Centre, Commission of the European Communities

SAX's DANGEROUS PROPERTIES OF INDUSTRIAL MATERIALS - Eight Edition - Van Nostrand Reinold

The information contained herein is based on our state of knowledge at the above-specified date. It refers solely to the product indicated and constitutes no guarantee of particular quality.

It is the duty of the user to ensure that this information is appropriate and complete with respect to the specific use intended.

This MSDS cancels and replaces any preceding release.

Legend to abbreviations and acronyms used in the safety data sheet:

ACGIH: American Conference of Governmental Industrial Hygienists

ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road.

AND: European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways

ATE: Acute Toxicity Estimate

ATEmix: Acute toxicity Estimate (Mixtures)

BCF: Biological Concentration Factor

BEI: Biological Exposure Index

BOD: Biochemical Oxygen Demand

CAS: Chemical Abstracts Service (division of the American Chemical Society).

CAV: Poison Center

CE: European Community

CLP: Classification, Labeling, Packaging.

CMR: Carcinogenic, Mutagenic and Reprotoxic

COD: Chemical Oxygen Demand

COV: Volatile Organic Compound

CSA: Chemical Safety Assessment

CSR: Chemical Safety Report

DMEL: Derived Minimal Effect Level

DNEL: Derived No Effect Level.

DPD: Dangerous Preparations Directive

DSD: Dangerous Substances Directive

EC50: Half Maximal Effective Concentration

ECHA: European Chemicals Agency

EINECS: European Inventory of Existing Commercial Chemical Substances.

ES: Exposure Scenario

GefStoffVO: Ordinance on Hazardous Substances, Germany.

GHS: Globally Harmonized System of Classification and Labeling of Chemicals.

IARC: International Agency for Research on Cancer

IATA: International Air Transport Association.

IATA-DGR: Dangerous Goods Regulation by the "International Air Transport Association" (IATA).

IC50: half maximal inhibitory concentration

ICAO: International Civil Aviation Organization.

ICAO-TI: Technical Instructions by the "International Civil Aviation Organization" (ICAO).

IMDG: International Maritime Code for Dangerous Goods.

INCI: International Nomenclature of Cosmetic Ingredients.

IRCCS: Scientific Institute for Research, Hospitalization and Health Care

KAFH: Keep Away From Heat

KSt: Explosion coefficient.

LC50: Lethal concentration, for 50 percent of test population.

LD50: Lethal dose, for 50 percent of test population.

LDLo: Leathal Dose Low

N.A.: Not Applicable

N/A: Not Applicable

N/D: Not defined/ Not available

NA: Not available

NIOSH: National Institute for Occupational Safety and Health

NOAEL: No Observed Adverse Effect Level

OSHA: Occupational Safety and Health Administration

PBT: Persistent, Bioaccumulative and Toxic
PGK: Packaging Instruction
PNEC: Predicted No Effect Concentration.
PSG: Passengers
RID: Regulation Concerning the International Transport of Dangerous Goods by Rail.
STEL: Short Term Exposure limit.
STOT: Specific Target Organ Toxicity.
TLV: Threshold Limiting Value.
TWATLV: Threshold Limit Value for the Time Weighted Average 8 hour day. (ACGIH Standard).
vPvB: Very Persistent, Very Bioaccumulative.
WGK: German Water Hazard Class.

Paragraphs modified from the previous revision:

- Safety Data Sheet
- SECTION 1: Identification of the substance/mixture and of the company/undertaking
- SECTION 2: Hazards identification
- SECTION 3: Composition/information on ingredients
- SECTION 7: Handling and storage
- SECTION 8: Exposure controls/personal protection
- SECTION 9: Physical and chemical properties
- SECTION 11: Toxicological information
- SECTION 12: Ecological information
- SECTION 13: Disposal considerations
- SECTION 14: Transport information
- SECTION 15: Regulatory information
- SECTION 16: Other information

Scenarij izpostavljenosti
Zinc Oxide

Scenarij izpostavljenosti, 04/07/2022

Identiteta snovi	
	Zinc Oxide
št.CAS	1314-13-2
Št. INDEKSA	030-013-00-7
št.EINECS	215-222-5
Registracijska številka	01-2119463881-32

Kazalo

1. **ES 1** Široko razširjena uporaba, ki jo izvajajo poklicni delavci; Razni produkti (PC9a, PC9b)

1. ES 1 Široko razširjena uporaba, ki jo izvajajo poklicni delavci; Razni produkti (PC9a, PC9b)

1.1 NASLOVNI ODSTAVEK

Ime scenarija izpostavljenosti	Gospodarska uporaba premazov in barv - Uporaba za trde penaste mase, premaze, lepila in tesnila
Datum - revizija	04/07/2022 - 1.0
Stopnja življenjskega cikla	Široko razširjena uporaba, ki jo izvajajo poklicni delavci
Glavna uporabniška skupina	Poklicne uporabe
Sektor(-ji) uporabe	Poklicne uporabe (SU22)
Kategorije izdelkov	Premazi in barve, razredčila, sredstva za odstranjevanje barv (PC9a) - Polnila, kiti, mavci, modelirna glina (PC9b)

Scenarij, ki prispeva Okolje	
CS1	ERC8a - ERC8d
Scenarij, ki prispeva Delojemalec	
CS2 Nanašanje z valjem in čopičem	PROC10
CS3 Nanašanje z valjem in čopičem	PROC10
CS4 Nanašanje z valjem, pršenjem in polivanjem	PROC11
CS5 Nanašanje z valjem, pršenjem in polivanjem	PROC11

1.2 Pogoji uporabe z vplivom na izpostavitev

1.2. CS1: Scenarij, ki prispeva Okolje (ERC8a, ERC8d)

Kategorije sproščanja v okolje	Široko razširjena uporaba nereaktivnega procesnega pripomočka (brez vključitve v ali na izdelek, notranja) - Široko razširjena uporaba nereaktivnega procesnega pripomočka (brez vključitve v ali na izdelek, zunanja) (ERC8a, ERC8d)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Trdna snov, srednje velika prašnost

Koncentracija substance v produktu:
Obsega delež snovi v izdelku do 25 %.

Uporabljena količina, pogostost in trajanje uporabe/(ali amortizacijska doba)

Uporabljene količine:
Poraba 50 ton/letno

Tip izločanja: Občasno sproščanje

Tehnični in organizacijski pogoji in ukrepi

Kontrolni ukrepi za preprečevanje izpustov

Nadgradnja obstoječega sistema ali dodatni ukrepi za čiščenje zraka, kot so na primer naprave za mokro čiščenje in/ali filtracija zraka in/ali termična oksidacija in/ali sistemi za pridobivanje pare, za doseganje zmanjšanja emisij v zraku.	Zrak - najmanjša učinkovitost: > 50 %

Pogoji in ukrepi v zvezi s komunalnimi čistilnimi napravami

Vrsta čistilne naprave (STP):
Komunalna STP čistilna naprava

STP odpadne vode (m3/dan): 2000

Pogoji in meritve v zvezi z obdelavo odpadkov (vključno z odpadki izdelka)

Ravnanje z odpadki
Zažiganje, odstranjevanje ali recikliranje s pomočjo zunanjih izvajalcev

1.2. CS2: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem in čopičem (PROC10)

Kategorije procesov	Nanašanje z valjčkom ali čopičem (PROC10)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Trdna snov, srednje velika prašnost

Koncentracija substance v produktu:
Obsega delež snovi v izdelku do 25 %.

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Uporabljene količine:
Poraba 50 ton/letno
Poraba 0.15 ton/dnevno

Trajanje:
Obsega dnevno izpostavljenost do 8 ure

Pogoji in ukrepi glede na osebno zaščito, higieno in preverjanje zdravstvenega stanja

Osebna zaščitna oprema

Nosite primerne rokavice, preizkušene po EN374. Uporabljajte ustrezno zaščito za obraz. Uporabljajte primerno zaščito oči. Zagotoviti programe za zaščito kože zaposlenih. Nosite ustrezno opremo za zaščito dihal.	Kožni - najmanjša učinkovitost: >= 90 %

Drugi pogoji uporabe, ki vplivajo na izpostavljenost delojemalcev

Notranja aplikacija
Gospodarska uporaba
Temperatura: Sprejme procesno temperaturo do .... 25°C

1.2. CS3: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem in čopičem (PROC10)

Kategorije procesov	Nanašanje z valjčkom ali čopičem (PROC10)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Trdna snov, srednje velika prašnost

Koncentracija substance v produktu:
Obsega delež snovi v izdelku do 25 %.

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Uporabljene količine:
Poraba 50 ton/letno
Poraba 0.15 ton/dnevno

Trajanje:
Obsega dnevno izpostavljenost do 8 ure

Pogoji in ukrepi glede na osebno zaščito, higieno in preverjanje zdravstvenega stanja

Osebna zaščitna oprema

Nosite primerne rokavice, preizkušene po EN374. Uporabljajte ustrezno zaščito za obraz. Uporabljajte primerno zaščito oči. Zagotoviti programe za zaščito kože zaposlenih.	Kožni - najmanjša učinkovitost: >= 90 %

Nosite ustrezno opremo za zaščito dihal.	

Drugi pogoji uporabe, ki vplivajo na izpostavljenost delojemalcev

Zunanja uporaba
Gospodarska uporaba
Temperatura: Sprejme procesno temperaturo do .... 25°C

1.2. CS4: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem, pršenjem in polivanjem (PROC11)

Kategorije procesov	Neindustrijsko brizganje (PROC11)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Trdna snov, srednje velika prašnost

Koncentracija substance v produktu:
Obsega delež snovi v izdelku do 25 %.

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Uporabljene količine:
Poraba 50 ton/letno
Poraba 0.15 ton/dnevno

Trajanje:
Obsega dnevno izpostavljenost do 8 ure

Pogoji in ukrepi glede na osebno zaščito, higieno in preverjanje zdravstvenega stanja

Osebna zaščitna oprema

Nosite primerne rokavice, preizkušene po EN374. Uporabljajte ustrezno zaščito za obraz. Uporabljajte primerno zaščito oči. Zagotoviti programe za zaščito kože zaposlenih. Nosite ustrezno opremo za zaščito dihal.	Kožni - najmanjša učinkovitost: >= 90 %

Drugi pogoji uporabe, ki vplivajo na izpostavljenost delojemalcev

Notranja aplikacija
Gospodarska uporaba
Temperatura: Sprejme procesno temperaturo do .... 25°C

1.2. CS5: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem, pršenjem in polivanjem (PROC11)

Kategorije procesov	Neindustrijsko brizganje (PROC11)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Trdna snov, srednje velika prašnost

Koncentracija substance v produktu:
Obsega delež snovi v izdelku do 25 %.

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Uporabljene količine:
Poraba 50 ton/letno
Poraba 0.15 ton/dnevno

Trajanje:
Obsega dnevno izpostavljenost do 8 ure

Pogoji in ukrepi glede na osebno zaščito, higieno in preverjanje zdravstvenega stanja

Osebna zaščitna oprema

Nosite primerne rokavice, preizkušene po EN374. Uporabljajte ustrezno zaščito za obraz. Uporabljajte primerno zaščito oči. Zagotoviti programe za zaščito kože zaposlenih. Nosite ustrezno opremo za zaščito dihal.	Kožni - najmanjša učinkovitost: >= 90 %

Drugi pogoji uporabe, ki vplivajo na izpostavljenost delojemalcev

Zunanja uporaba
Gospodarska uporaba
Temperatura: Sprejme procesno temperaturo do .... 25°C

1.3 Ocena izpostavljenosti in sklicevanje na njen vir

1.3. CS2: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem in čopičem (PROC10)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji izpostavljenosti	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)
inhalacijski, sistemsko	<= 1.4 mg/dan	MEASE	N/A
stik s kožo, sistemsko	<= 0.12 mg/dan	MEASE	N/A
kombinirane poti, sistemsko	<= 1.5 mg/dan	MEASE	<= 0.15

1.3. CS3: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem in čopičem (PROC10)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji izpostavljenosti	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)
inhalacijski, sistemsko	<= 6 mg/dan	MEASE	N/A
stik s kožo, sistemsko	<= 0.12 mg/dan	MEASE	N/A
kombinirane poti, sistemsko	<= 6 mg/dan	MEASE	<= 0.6

1.3. CS4: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem, pršenjem in polivanjem (PROC11)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji izpostavljenosti	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)
inhalacijski, sistemsko	<= 6 mg/dan	MEASE	N/A
stik s kožo, sistemsko	<= 0.12 mg/dan	MEASE	N/A
kombinirane poti, sistemsko	<= 6 mg/dan	MEASE	<= 0.6

1.3. CS5: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem, pršenjem in polivanjem (PROC11)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji izpostavljenosti	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)

inhalacijski, sistemsko	<= 24 mg/dan	MEASE	N/A
stik s kožo, sistemsko	<= 0.12 mg/dan	MEASE	N/A
kombinirane poti, sistemsko	<= 24 mg/dan	MEASE	<= 2.4

1.4 Smernica za uporabnika, za ugotavljanje, ali dela znotraj omejitev scenarija izpostavitve

Vodilo za preverjanje skladnosti s scenarijem izpostavljenosti:

Če so bili sprejeti dodatni ukrepi za upravljanje s tveganji/pogoji za uporabo, morajo uporabniki zagotoviti vsaj enakovredno raven upravljanja s tveganji.

Scenarij izpostavljenosti
Ethyl acetate

Scenarij izpostavljenosti, 13/07/2021

Identiteta snovi	
	Ethyl acetate
št.CAS	141-78-6
Št. INDEKSA	607-022-00-5
št.EINECS	205-500-4
Registracijska številka	01-2119475103-46

Kazalo

1. **ES 1** Široko razširjena uporaba, ki jo izvajajo poklicni delavci; Premazi in barve, razredčila, sredstva za odstranjevanje barv (PC9a)

1. ES 1 Široko razširjena uporaba, ki jo izvajajo poklicni delavci; Premazi in barve, razredčila, sredstva za odstranjevanje barv (PC9a)

1.1 NASLOVNI ODSTAVEK

Ime scenarija izpostavljenosti	Gospodarska uporaba premazov in barv s pleskanjem in valjanjem - Redčenje koncentratov in ravnanje z njimi
Datum - revizija	13/07/2021 - 1.0
Stopnja življenjskega cikla	Široko razširjena uporaba, ki jo izvajajo poklicni delavci
Glavna uporabniška skupina	Poklicne uporabe
Sektor(-ji) uporabe	Poklicne uporabe (SU22)
Kategorije izdelkov	Premazi in barve, razredčila, sredstva za odstranjevanje barv (PC9a)

Scenarij, ki prispeva Okolje

CS1	ERC8a - ERC8d

Scenarij, ki prispeva Delojemalec

CS2 Redčenje koncentratov in ravnanje z njimi	PROC8a
CS3 Redčenje koncentratov in ravnanje z njimi	PROC10

1.2 Pogoji uporabe z vplivom na izpostavitev

1.2. CS1: Scenarij, ki prispeva Okolje (ERC8a, ERC8d)

Kategorije sproščanja v okolje	Široko razširjena uporaba nereaktivnega procesnega pripomočka (brez vključitve v ali na izdelek, notranja) - Široko razširjena uporaba nereaktivnega procesnega pripomočka (brez vključitve v ali na izdelek, zunanja) (ERC8a, ERC8d)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Tekoč

Koncentracija substance v produktu:
Obsega delež snovi v izdelku do 100 %.

1.2. CS2: Scenarij, ki prispeva Delojemalec: Redčenje koncentratov in ravnanje z njimi (PROC8a)

Kategorije procesov	Prenos snovi ali zmesi (polnjenje in praznjenje) na nenamenskih napravah (PROC8a)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Tekoč

Koncentracija substance v produktu:
Obsega delež snovi v izdelku do 100 %.

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Trajanje:
Obsega dnevno izpostavljenost do 8 ure

Tehnični in organizacijski pogoji in ukrepi

Tehnični in organizacijski ukrepi
Zagotovite zadostno stopnjo splošnega prezračevanja (ne manj kot 3 do 5 izmenjav zraka na uro).

Drugi pogoji uporabe, ki vplivajo na izpostavljenost delojemalcev

Notranja aplikacija
Gospodarska uporaba
Temperatura: Predpostavljena je uporaba pri temperaturah ki ne presegajo temperaturo okolice za več kot 20 °C.

1.2. CS3: Scenarij, ki prispeva Delojemalec: Redčenje koncentratov in ravnanje z njimi (PROC10)

Kategorije procesov	Nanašanje z valjčkom ali čopičem (PROC10)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:

Tekoč

Koncentracija substance v produktu:

Obsega delež snovi v izdelku do 100 %.

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Trajanje:

Obsega dnevno izpostavljenost do 8 ure

Tehnični in organizacijski pogoji in ukrepi

Tehnični in organizacijski ukrepi

Zagotovite zadostno stopnjo splošnega prezračevanja (ne manj kot 3 do 5 izmenjav zraka na uro).
Zagotovite redno preverjanje in vzdrževanje nadzornih ukrepov.
Zagotovite dodatno prezračevanje na točkah, kjer nastopajo emisije.

Drugi pogoji uporabe, ki vplivajo na izpostavljenost delojemalcev

Notranja aplikacija
Gospodarska uporaba
Temperatura: Predpostavljena je uporaba pri temperaturah ki ne presegajo temperaturo okolice za več kot 20 °C.

1.3 Ocena izpostavljenosti in sklicevanje na njen vir

1.3. CS1: Scenarij, ki prispeva Okolje (ERC8a, ERC8d)

Pot izločanja	Stopnja sproščanja	Metoda ocene izločanja
Voda	0.014 kg/dan	N/A
Zrak	0.666 kg/dan	N/A
tla	0 kg/dan	N/A

cilj zaščite	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)
sladka voda	= 0.0004036 mg/L	N/A	< 0.01
sladkovodne usedline	= 0.002 mg/kg KW	N/A	< 0.01
morske usedline	= 0.0003587 mg/kg KW	N/A	< 0.01
Obdelana zemlja	= 0.000113 mg/kg KW	N/A	< 0.336

1.3. CS2: Scenarij, ki prispeva Delojemalec: Redčenje koncentratov in ravnanje z njimi (PROC8a)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji izpostavljenosti	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)
inhalacijski, sistemsko, dolgoročno	= 51.39 mg/m³	ECETOC TRA delojemalec v3	= 0.07
inhalacijski, lokalno, dolgoročno	= 51.39 mg/m³	ECETOC TRA delojemalec v3	= 0.07
stik s kožo, sistemsko, dolgoročno	= 13.71 mg/kg bw/dan	ECETOC TRA delojemalec v3	= 0.218

1.3. CS3: Scenarij, ki prispeva Delojemalec: Redčenje koncentratov in ravnanje z njimi (PROC10)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji izpostavljenosti	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)
inhalacijski, sistemsko, dolgoročno	= 51.39 mg/m³	ECETOC TRA delojemalec v3	= 0.07
inhalacijski, lokalno, dolgoročno	= 51.39 mg/m³	ECETOC TRA delojemalec v3	= 0.07
stik s kožo, sistemsko, dolgoročno	= 27.43 mg/kg bw/dan	ECETOC TRA delojemalec v3	= 0.435

1.4 Smernica za uporabnika, za ugotavljanje, ali dela znotraj omejitev scenarija izpostavitve

Vodilo za preverjanje skladnosti s scenarijem izpostavljenosti:

Če so bili sprejeti dodatni ukrepi za upravljanje s tveganji/pogoji za uporabo, morajo uporabniki zagotoviti vsaj enakovredno raven upravljanja s tveganji.

Scenarij izpostavljenosti
Acetone

Scenarij izpostavljenosti, 27/08/2021

Identiteta snovi	
	Acetone
št.CAS	67-64-1
Št. INDEKSA	606-001-00-8
št.EINECS	200-662-2
Registracijska številka	01-2119471330-49

Kazalo

1. **ES 1** Široko razširjena uporaba, ki jo izvajajo poklicni delavci; Premazi in barve, razredčila, sredstva za odstranjevanje barv (PC9a)

1. ES 1 Široko razširjena uporaba, ki jo izvajajo poklicni delavci; Premazi in barve, razredčila, sredstva za odstranjevanje barv (PC9a)

1.1 NASLOVNI ODSTAVEK

Ime scenarija izpostavljenosti	Gospodarska uporaba premazov in barv
Datum - revizija	27/08/2021 - 1.0
Stopnja življenjskega cikla	Široko razširjena uporaba, ki jo izvajajo poklicni delavci
Glavna uporabniška skupina	Poklicne uporabe
Sektor(-ji) uporabe	Poklicne uporabe (SU22)
Kategorije izdelkov	Premazi in barve, razredčila, sredstva za odstranjevanje barv (PC9a)

Scenarij, ki prispeva Okolje

CS1	ERC8a - ERC8c - ERC8d - ERC8f

Scenarij, ki prispeva Delojemalec

CS2 Prenosi materiala	PROC8a
CS3 Nanašanje z valjem in čopičem	PROC10

1.2 Pogoji uporabe z vplivom na izpostavitev

1.2. CS1: Scenarij, ki prispeva Okolje (ERC8a, ERC8c, ERC8d, ERC8f)

Kategorije sproščanja v okolje	Široko razširjena uporaba nereaktivnega procesnega pripomočka (brez vključitve v ali na izdelek, notranja) - Široko razširjena uporaba, rezultat katere je vključitev v ali na izdelek (notranja) - Široko razširjena uporaba nereaktivnega procesnega pripomočka (brez vključitve v ali na izdelek, zunanja) - Široko razširjena uporaba, rezultat katere je vključitev v ali na izdelek (zunanja) (ERC8a, ERC8c, ERC8d, ERC8f)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Tekočina, parni tlak > 10 kPa pri STP

Koncentracija substance v produktu:
Obsega koncentracije do 70 %

Uporabljena količina, pogostost in trajanje uporabe/(ali amortizacijska doba)

Dnevi emisij: 365 dnevi na leto

Pogoji in meritve v zvezi z obdelavo odpadkov (vključno z odpadki izdelka)

Ravnanje z odpadki
Zunanja obdelava in odstranjevanje odpadkov morata biti skladna s krajevnimi in/ali nacionalnimi predpisi.

Drugi pogoji uporabe, ki vplivajo na izpostavljenost okolja

Krajevni faktor razredčenja morske vode:: 100
Krajevni faktor razredčenja sladke vode: 10

1.2. CS2: Scenarij, ki prispeva Delojemalec: Prenosi materiala (PROC8a)

Kategorije procesov	Prenos snovi ali zmesi (polnjenje in praznjenje) na nenamenskih napravah (PROC8a)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:
Tekočina, parni tlak > 10 kPa pri STP

Koncentracija substance v produktu:
Obsega koncentracije do 70 %

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Trajanje:

Obsega izpostavljenost do 4 h

Tehnični in organizacijski pogoji in ukrepi

Tehnični in organizacijski ukrepi

Naravno prezračevanje poteka skozi vrata, okna itd. Nadzorovano prezračevanje pomeni dovajanje ali odvajanje zraka z aktivnim ventilatorjem.

Pogoji in ukrepi glede na osebno zaščito, higieno in preverjanje zdravstvenega stanja

Osebna zaščitna oprema

Nosite primerne rokavice, preizkušene po EN374.
Uporabljajte primerno zaščito oči.

1.2. CS3: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem in čopičem (PROC10)

Kategorije procesov	Nanašanje z valjčkom ali čopičem (PROC10)

Lastnosti izdelka (proizvoda)

Fizikalna oblika izdelka:

Tekočina, parni tlak > 10 kPa pri STP

Koncentracija substance v produktu:

Obsega koncentracije do 70 %

Uporabljena količina, pogostost in trajanje uporabe/izpostavljenost

Trajanje:

Obsega izpostavljenost do 4 h

Tehnični in organizacijski pogoji in ukrepi

Tehnični in organizacijski ukrepi

Naravno prezračevanje poteka skozi vrata, okna itd. Nadzorovano prezračevanje pomeni dovajanje ali odvajanje zraka z aktivnim ventilatorjem.

Pogoji in ukrepi glede na osebno zaščito, higieno in preverjanje zdravstvenega stanja

Osebna zaščitna oprema

Nosite primerne rokavice, preizkušene po EN374.
Uporabljajte primerno zaščito oči.

1.3 Ocena izpostavljenosti in sklicevanje na njen vir

1.3. CS1: Scenarij, ki prispeva Okolje (ERC8a, ERC8c, ERC8d, ERC8f)

Dodatne informacije glede ocene izpostavljenosti:

Ker ni bila ugotovljena nobena nevarnost za okolje, ni bila opravljena ocena izpostavljenosti in opis tveganja, ki bi se nanašala na okolje.

1.3. CS2: Scenarij, ki prispeva Delojemalec: Prenosi materiala (PROC8a)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji izpostavljenosti	Stopnja izpostavljenosti	Metoda izračuna	Stopnja opredelitve tveganja (RCR)
inhalacijski	N/A	ECETOC TRA Delojemalec v2.0	= 0.6
stik s kožo	N/A	ECETOC TRA Delojemalec v2.0	= 0.07
kombinirane poti	N/A	ECETOC TRA Delojemalec v2.0	= 0.67

1.3. CS3: Scenarij, ki prispeva Delojemalec: Nanašanje z valjem in čopičem (PROC10)

Pot izpostavljenosti, Učinki na zdravje, Indikatorji	Stopnja	Metoda izračuna	Stopnja opredelitve

izpostavljenosti	izpostavljenosti		tveganja (RCR)
inhalacijski	N/A	ECETOC TRA Delojemalec v2.0	= 0.6
stik s kožo	N/A	ECETOC TRA Delojemalec v2.0	= 0.15
kombinirane poti	N/A	ECETOC TRA Delojemalec v2.0	= 0.75

1.4 Smernica za uporabnika, za ugotavljanje, ali dela znotraj omejitev scenarija izpostavitve

Vodilo za preverjanje skladnosti s scenarijem izpostavljenosti:

Če so bili sprejeti dodatni ukrepi za upravljanje s tveganji/pogoji za uporabo, morajo uporabniki zagotoviti vsaj enakovredno raven upravljanja s tveganji.